Government of
Saskatchewan

Annual Report 2003

Saskatchewan Health
Vital Statistics

1942 Hamilton Street
Regina, Saskatchewan
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104-05028/

Letters of Transmittal

To the Honourable Dr. L.M. Haverstock
Lieutenant Governor of Saskatchewan

May It Please Your Honour:

We respectfully submit, for your consideration, the Annual Report on Saskatchewan Vital Statistics for the calendar year 2003.

Respectfully submitted,

John T. Nilson, Q.C.
Minister of Health

To the Honourable John T. Nilson, Q.C.
Minister of Health

Your Honour:

On behalf of department staff, I am pleased to present the Annual Report on Saskatchewan Vital Statistics for the calendar year 2003.

This interim report presents a concise record of those vital events that occurred in Saskatchewan during the calendar year 2003.

Respectfully submitted,

Glenda Yeates
Deputy Minister

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Terms and Definitions

A summary of symbols, definitions, and the method of computing rates used in this report are given below.

Definitions

Population	This report contains postcensal estimates for 1993-1995 and 1997-2003; and, final census figures for 1996.
Live Births	Infants born alive, i.e., excluding stillbirths.
Stillbirths	Fetal deaths occurring after at least 20 weeks pregnancy or after attaining a weight of at least 500 grams.
Deaths	Excludes stillbirths.
Infant Deaths	Deaths under 1 year of age.
Neonatal Deaths	Deaths under 28 days (4 weeks) of age.
Perinatal Deaths	Fetal deaths of 500 grams or more plus infant deaths under 7 days (1 week) of age.
Natural Increase	Excess of births over deaths.

Rates (unless otherwise indicated, computed as follows)

Live Births	: per 1,000 population
Stillbirths	: per 1,000 live births
Marriages	: per 1,000 population
Divorces	: per 100,000 population
Natural Increase	: per 1,000 population

Introduction

The Vital Statistics Annual Report represents a concise record of those vital events which occurred in Saskatchewan during the calendar year. The Report has been prepared in accordance with the requirements of subsections 50(1) and 50(2) of *The Vital Statistics Act, 1995.*

The Vital Statistics Annual Report 2003 records vital events by place of occurrence for 2003 (vital events which occurred in Saskatchewan in 2003). It includes for example, births to Saskatchewan residents who were in the province at the time of giving birth as well as residents of other provinces (or countries) who were in Saskatchewan at the time of giving birth.

The data in this report are based on original registration forms and do not include amendments. The vital events recorded in this report for years previous to 2003 are by place of residence, unless otherwise indicated.

Table 1. Summary of Vital Statistics, Saskatchewan 1998 – 2003

Item	1998	1999	2000	2001*	2002*	2003*
Population	1,024	1,025	1,022	1,017	1,012	995
Live Births	12,710	12,604	12,140	12,275	11,733	12,113
Crude Rate++	12.4	12.3	11.9	12.0	11.6	12.2
Deaths	8,905	9,044	8,956	8,740	8,818	8,829
Crude Rate++	8.7	8.8	8.8	8.6	8.7	8.9
Natural Increase	3,872	3,534	3,142	3,475	2,915	3,288
Crude Rate++	3.8	3.4	3.1	3.4	2.9	3.3
Infant Deaths	91	79	82	68	57	67
Crude Rate**	7.1	6.3	6.8	5.5	4.9	5.5
Neonatal Deaths	43	50	41	63	54	57
Crude Rate**	4.1	4.0	3.4	5.2	4.4	4.7
Perinatal Deaths@						
500 grams or more (20+ weeks Gestation)	121	115	104	128	126	119
Crude Rate+++	9.5	9.2	8.6	10.4	10.7	9.8
500 grams or more (28+ weeks Gestation)	107	91	91	95	97	91
Crude Rate+++	8.4	7.3	7.5	7.7	7.8	7.5
Stillbirths@						
500 grams or more (20+ weeks Gestation)	62	72	72	81	86	78
Crude Rate**	4.9	5.8	6.0	6.7	7.3	6.4
500 grams or more (28+ weeks Gestation)	48	48	59	49	57	50
Crude Rate**	3.8	3.8	4.9	4.0	4.8	4.1
Marriages	5,671	5,919	5,717	5,060	5,051	4,976
Crude Rate++	5.5	5.8	5.6	5.0	5.0	5.0
Divorces and Annulments	2,223	2,230	2,222	1,976	1,974	2,001

* Preliminary figures only. Final figures not yet released by Statistics Canada.
** Crude Rate per 1,000 live births
++ Crude Rate per 1,000 population
+++ Crude Rate per 1,000 total births (live births and stillbirths)
@ See Terms and Definitions, page 1

A. Population

1. The Historical Trend

The estimated population of 994,843 for 2003 is a decrease of 1.68 per cent over the 2002 estimated population of 1,011,808.

Table 2. The Historical Trend in Saskatchewan Population

Year	Population (000's)
1931	922
1941	896
1951	832
1961	925
1971	926
1981	968
1991	991
2001	1,017*
2002	1,012*
2003	995*

* Statistics Canada postcensal estimate at July 1st. All other figures are final census.

2. The Distribution of the Total Population by Age Grouping

The proportion of older people (65 years of age and over) has been increasing in Canada as a whole and in Saskatchewan. In Saskatchewan the proportion of persons 65 years of age and over is greater than in Canada as a whole (14.8 percent and 12.8 percent respectively).

Table 3. Distribution of Total Population by Age Grouping, 2003 (000's)

	Canada		Saskatchewan	
Age Group	Number	Percent	Number	Percent
Total	31,629.7	100.0	994.8	100.0
0-19	7,902.2	25.0	280.6	28.2
20-44	11,735.9	37.1	337.3	33.9
45-64	7,931.5	25.1	229.3	23.1
65+	4,060.1	12.8	147.6	14.8

Table 4. Percentage Distribution by Sex, Saskatchewan, for Selected Years

Year	Male	Female	Males per 100 Females
1921	54.6	45.4	120
1931	54.2	45.8	119
1941	53.3	46.7	114
1951	52.2	47.8	109
1961	51.8	48.2	108
1971	50.8	49.2	103
1981	50.2	49.8	101
1991	49.6	50.4	99
2001*	49.6	50.4	98
2002*	49.6	50.4	98
2003*	49.7	50.3	99

B. Births

1. Live Births

During the year 2003 a total of 12,113 live births occurred in the province of Saskatchewan. This total includes births to Saskatchewan mothers residing in the province at the time of giving birth and those births occurring to mothers who normally reside outside the province but who were in Saskatchewan at the time of giving birth.

The total of 12,113 live births represents a crude birth rate of 12.2 live births per 1,000 population, which is slightly higher than last year's birth rate of 11.6.

The 2001 birth rates for Saskatchewan, for Canada, and for the Provinces are shown below for comparison.

Table 5. Live Birth Rates per 1,000 Population, Canada and Provinces, 2001

Province	Rate
Canada	10.6
Newfoundland	8.9
Prince Edward Island	10.3
Nova Scotia	9.5
New Brunswick	9.6
Quebec	9.9
Ontario	10.7
Manitoba	12.2
Saskatchewan	11.8
Alberta	11.9
British Columbia	9.9
Yukon	11.8
Northwest Territories	16.0
Nunavut	26.6

2. Stillbirths

During the year 2003 a total of 78 stillbirths occurred in the province. The definition of stillbirth is given on page 1. The 78 stillbirths occurred after 20 or more weeks gestation; 50 of the stillbirths occurred after 28 or more weeks gestation. These two totals represent crude rates of 7.8 and 5.0 stillbirths per 1,000 live births respectively.

C. Deaths

During the year 2003 a total of 8,829 deaths occurred within the province of Saskatchewan. This represents a crude death rate of 8.9 deaths per 1,000 population, which is slightly higher than the 2002 crude rate of 8.7.

The 2001 crude death rates for Saskatchewan, for Canada, and for the provinces are shown in the table below for comparison.

Table 6. Crude Death Rates per 1,000 Population, Canada and Provinces, 2001

Province	Rate
Canada	7.3
Newfoundland	8.1
Prince Edward Island	8.4
Nova Scotia	8.4
New Brunswick	8.3
Quebec	7.3
Ontario	7.3
Manitoba	8.9
Saskatchewan	9.1
Alberta	5.9
British Columbia	6.9
Yukon	4.8
Northwest Territories	4.1
Nunavut	4.8

Table 7. Age Specific Death Rates per 1,000 Population, Saskatchewan, 1993 – 2003

	All	Age Group					
Year	Ages	Under 5	5-14	15-24	25-44	45-64	65+
1993	8.1	1.9	0.2	0.9	1.1	5.8	44.8
1994	8.2	2.0	0.3	0.8	1.1	5.9	44.9
1995	8.4	2.2	0.3	0.8	1.2	5.8	45.5
1996	8.6	1.9	0.2	0.7	1.2	5.5	47.4
1997	8.4	2.0	0.3	0.7	1.2	5.3	46.9
1998	8.7	1.6	0.1	0.8	1.0	5.2	48.4
1999	8.8	1.5	0.2	0.6	1.1	5.2	49.2
2000	8.8	1.5	0.2	0.8	1.2	4.9	49.0
2001	8.6	1.3	0.1	0.7	1.1	4.9	48.4
2002*	8.7	1.2	0.2	0.7	1.0	4.9	48.9
2003*	8.9	1.3	0.2	0.8	1.2	4.5	49.1

* See footnotes in Table 1

Table 8. Number of Deaths by cause occurring in Saskatchewan in 2003

	Deaths	Percent	Rate*
All Causes of Death	8829	100.0	887.5
1 Salmonella infections	0	0.0	0.0
2 Shigellosis and amebiasis	0	0.0	0.0
3 Certain other intestinal infections	7	0.1	0.7
4 Respiratory tuberculosis	6	0.1	0.6
5 Other tuberculosis	0	0.0	0.0
6 Whooping cough	0	0.0	0.0
7 Scarlet fever and erysipelas	1	0.0	0.1
8 Meningococcal infection	0	0.0	0.0
9 Septicemia	61	0.7	6.1
10 Syphilis	0	0.0	0.0
11 Acute poliomyelitis	2	0.0	0.2
12 Arthropod-borne viral encephalitis	0	0.0	0.0
13 Measles	0	0.0	0.0
14 Viral hepatitis	11	0.1	1.1
15 Human immunodeficiency virus (HIV) disease	8	0.1	0.8
16 Malaria	0	0.0	0.0
17 Other and unspecified infectious and parasitic diseases and their sequelae	23	0.3	2.3
18 Malignant neoplasms of lip, oral cavity and pharynx	31	0.4	3.1
19 Malignant neoplasm of esophagus	54	0.6	5.4
20 Malignant neoplasm of stomach	49	0.6	4.9
21 Malignant neoplasms of colon, rectum and anus	218	2.5	21.9
22 Malignant neoplasms of liver and intrahepatic bile ducts	37	0.4	3.7
23 Malignant neoplasm of pancreas	112	1.3	11.3
24 Malignant neoplasm of larynx	14	0.12	1.4
25 Malignant neoplasms of trachea, bronchus and lung	545	6.2	54.8
26 Malignant melanoma of skin	25	0.3	2.5
27 Malignant neoplasm of breast	171	1.9	17.2
28 Malignant neoplasm of cervix uteri	10	0.1	1.0
29 Malignant neoplasms of corpus uteri and uterus, part unspecified	20	0.2	2.0
30 Malignant neoplasm of ovary	49	0.6	4.9
31 Malignant neoplasm of prostate	225	2.5	22.6
32 Malignant neoplasms of kidney and renal pelvis	55	0.6	5.5
33 Malignant neoplasm of bladder	61	0.7	6.1
34 Malignant neoplasms of meninges, brain and other parts of central nervous system	49	0.6	4.9
35 Hodgkin's disease	1	0.0	0.1
36 Non-Hodgkin's lymphoma	95	1.1	9.5
37 Leukemia	84	0.1	8.4
38 Multiple myeloma and immunoproliferative neoplasms	32	0.4	3.2

	Deaths	Percent	Rate*
39 Other and unspecified malignant neoplasms of lymphoid, hematopoietic and related tissue	0	0.0	0.0
40 All other and unspecified malignant neoplasms	325	3.7	32.7
41 In situ neoplasms, benign neoplasms and neoplasms of uncertain or unknown behavior	65	0.7	6.5
42 Anemias	29	0.3	2.9
43 Diabetes mellitus	339	3.1	34.1
44 Malnutrition	8	0.1	0.8
45 Other nutritional deficiencies	4	0.1	0.4
46 Meningitis	2	0.0	0.2
47 Parkinson's disease	59	0.7	5.9
48 Alzheimer's disease	230	2.6	23.1
49 Acute rheumatic fever and chronic rheumatic heart diseases	19	0.2	1.9
50 Hypertensive heart disease	40	0.5	4.0
51 Hypertensive heart and renal disease	5	0.1	0.5
52 Acute myocardial infarction	614	7.0	61.7
53 Other acute ischemic heart diseases	12	0.1	1.2
54 Atherosclerotic cardiovascular disease, so described	92	1.0	9.2
55 All other forms of chronic ischemic heart disease	745	8.4	74.9
56 Acute and subacute endocarditis	3	0.0	0.3
57 Diseases of pericardium and acute myocarditis	4	0.0	0.4
58 Heart failure	305	3.5	30.6
59 All other forms of heart disease	318	3.6	32.0
60 Essential (primary) hypertension and hypertensive renal disease	78	0.9	7.8
61 Cerebrovascular diseases	684	7.7	68.8
62 Atherosclerosis	37	0.4	3.7
63 Aortic aneurysm and dissection	74	0.8	7.3
64 Other diseases of arteries, arterioles and capillaries	44	0.5	4.4
65 Other disorders of circulatory system	13	0.1	1.3
66 Influenza	14	0.2	1.4
67 Pneumonia	254	2.9	25.5
68 Acute bronchitis and bronchiolitis	0	0.0	0.0
69 Unspecified acute lower respiratory infection	3	0.0	0.3
70 Bronchitis, chronic and unspecified	6	0.1	0.6
71 Emphysema	32	0.4	3.2
72 Asthma	0	0.0	0.0
73 Other chronic lower respiratory diseases	341	3.9	34.3
74 Pneumoconioses and chemical effects	1	0.0	0.1
75 Pneumonitis due to solids and liquids	27	0.3	2.7
76 Other diseases of respiratory system	91	1.0	9.1
77 Peptic ulcer	16	0.2	1.6
78 Diseases of appendix	1	0.0	0.1
79 Hernia	10	0.1	1.0

	Deaths	Percent	Rate*
80 Alcoholic liver disease	40	0.5	4.0
81 Other chronic liver disease and cirrhosis	32	0.4	3.2
82 Cholelithiasis and other disorders of gallbladder	8	0.1	0.8
83 Acute and rapidly progressive nephritic and nephrotic syndrome	0	0.0	0.0
84 Chronic glomerulonephritis, nephritis & nephritis not specified as acute or chronic and renal sclerosis unspecified	0	0.0	0.0
85 Renal failure	168	1.9	16.9
86 Other disorders of kidney	0	0.0	0.0
87 Infections of kidney	5	0.1	0.5
88 Hyperplasia of prostate	4	0.0	0.4
89 Inflammatory diseases of female pelvic organs	1	0.0	0.1
90 Pregnancy with abortive outcome	0	0.0	0.0
91 Other complications of pregnancy, childbirth and the puerperium	0	0.0	0.1
92 Certain conditions originating in the perinatal period	28	0.3	2.8
93 Congenital malformations, deformations and chromosomal abnormalities	43	0.5	4.3
94 Symptoms, signs and abnormal clinical and laboratory findings, not elsewhere classified	106	1.2	10.7
95 All other diseases (Residual)	825	9.3	82.9
96 Motor vehicle accidents	119	1.2	12.0
97 Other land transport accidents	26	0.3	2.6
98 Water, air and space, and other and unspecified transport accidents	3	0.0	0.3
99 Falls	78	0.9	7.8
100 Accidental discharge of firearms	3	0.0	.3
101 Accidental drowning and submersion	7	0.1	0.7
102 Accidental exposure to smoke, fire and flames	10	0.1	1.0
103 Accidental poisoning and exposure to noxious substances	29	0.3	2.9
104 Other and unspecified nontransport accidents and their sequelae	137	1.6	13.8
105 Intentional self-harm (suicide) by discharge of firearms	35	0.4	3.5
106 Intentional self-harm (suicide) by other and unspecified means and their sequelae	58	0.7	5.8
107 Assault (homicide) by discharge of firearms	7	0.1	0.7
108 Assault (homicide) by other and unspecified means and their sequelae	27	0.3	2.7
109 Legal intervention	0	0.0	0.0
110 Discharge of firearms, undetermined intent	0	0.0	0.0
111 Other and unspecified events of undetermined intent and their sequelae	13	0.1	1.3
112 Operations of war and their sequelae	0	0.0	0.0
113 Complications of medical and surgical care	8	0.1	0.8

*Crude Rate per 100,000 population (Statistics Canada Population Base)

Accidents and Violence

During the year 2003 a total of 412 deaths due to accidents occurred in the province of Saskatchewan. This represents a crude rate of 41.4 deaths by accidents per 100,000 population in 2003 as compared to a crude rate of 39.9 deaths by accident per 100,000 population in 2002.

The number of suicides, which occurred in Saskatchewan during 2003, was 93, a crude rate of 9.3 suicides per 100,000 population, which is slightly lower than the 10.3 crude rate per 100,000 population recorded in 2002.

There were 34 homicides in Saskatchewan in 2003, an increase over the 25 homicides reported in 2002.

D. Natural Increase in Population

In 2003 the natural increase was 3,284 and the estimated actual increase was –17,325 giving rates per 1,000 population of 3.3 and –17.1 respectively.

Table 9. Natural Increase and Actual Increase, Saskatchewan, 1993 – 2003*

Year	Population	Live Births	Deaths	Natural Increase Number	Natural Increase Rate per 1,000 Pop.	Est. Actual Increase Number	Est. Actual Increase Rate per 1,000 Pop.
1993	1,003,100	14,269	8,164	6,105	6.1	9,400	9.4
1994	1,016,200	14,038	8,308	5,730	5.6	13,100	12.9
1995	1,016,162	13,515	8,475	5,040	5.0	-38	-0.04
1996	1,022,537	12,974	7,713	5,261	5.1	6,375	6.2
1997	1,023,500	12,860	8,637	4,223	4.1	963	0.9
1998	1,024,387	12,777	8,838	3,939	3.8	887	0.9
1999	1,025,495	12,604	9,044	3,560	3.5	1,008	1.0
2000	1,021,992	12,140	8,956	3,184	3.1	-3,503	-3.4
2001*	1,017,087	12,275	8,740	3,535	3.5	-4,905	-4.8
2002*	1,011,808	11,733	8,818	2,915	2.9	-5,279	-5.2
2003*	994,843	12,113	8,829	3,284	3.3	-17,325	-17.1

* See footnotes in Table 1

E. Marriages

During the year 2003 a total of 4,976 marriages occurred in Saskatchewan. This total represents a crude rate of 5.0 marriages per 1,000 population. Marriage rates for Canada, the Provinces, and Saskatchewan for 2001 are given below for comparison.

Table 10. Marriages Rate per 1,000 Population, Canada and the Provinces, 2001

Province	Rate
Canada	4.9
Newfoundland	5.6
Prince Edward Island	6.3
Nova Scotia	5.3
New Brunswick	5.3
Quebec	3.0
Ontario	5.5
Manitoba	5.6
Saskatchewan	5.6
Alberta	6.1
British Columbia	5.3
Yukon	5.0
Northwest Territories	3.2
Nunavut	3.0

F. Divorces

In 2003 a total of 2,001 divorces and annulments were registered in Saskatchewan at the time of publication. This does not represent the total number of divorce petitions filed in 2003 since some petitions are not yet finalized.

G. Life Expectancy

A life expectancy table is, in effect, the history of mortality of 100,000 male babies and of 100,000 female babies born at the same time. Life expectancy figures provide a graphic picture of the extent to which the saving of lives has gradually prolonged the average expectation of life and are a fairly good reflection of the general health and survival conditions at the time of their compilation.

According to the Saskatchewan life table compiled on the basis of the 1996 census, the life expectancy at birth reached an all time peak for females, 81.30 years, and for males, 75.40 years. The gain in life expectancy is greater in females.

Table 11. Life Expectancy, Saskatchewan, 1941, 1961, 1981, 1996.

	Life Expectancy				Gain or Loss In Life Expectancy		
	1941	1961	1981	1996	1961 over 1941	1981 over 1961	1996 over 1981
			Males				
At Birth	65.43	70.27	72.43	75.40	4.84	2.16	2.97
20	51.28	53.49	54.35	56.60	2.21	0.86	2.25
40	33.32	34.99	35.92	37.90	1.67	0.93	1.98
60	16.82	18.10	19.09	20.40	1.28	0.99	1.31
80	5.76	6.31	7.16	7.60	0.55	0.85	0.44
			Females				
At Birth	68.19	75.93	79.61	81.30	7.74	3.68	1.69
20	53.08	58.35	60.85	62.40	5.27	2.50	1.55
40	34.96	39.09	41.64	43.00	4.13	2.55	1.36
60	18.26	21.09	23.65	24.80	2.83	2.56	1.15
80	6.38	7.29	8.94	9.90	0.91	1.65	0.96

Note: Source of figures for 1941: Life Tables for Canada and Regions, 1941 and 1931, D.B.S. Ottawa 1947. These figures have been calculated for the prairie provinces. The figures for 1961 were calculated for Saskatchewan by the Department of Health. The figures for 1981 and 1996 were taken from the Statistics Canada publication, Life Tables, Canada and Provinces, 1980-1982 and 1995-1997.

H. Adoptions

There were 196 adoptions registered in Saskatchewan during 2003, compared to 136 adoptions in 2002. The total of 196 adoptions registered includes out-of-province adoptions of persons born in Saskatchewan as well as adoptions in Saskatchewan of persons born elsewhere.

I. Legal Changes of Name

During 2003 a total of 737 legal change of name applications were registered in Saskatchewan. This represents an increase from the 716 change of name applications that were registered in 2002. The number of applications does not reflect the number of persons who changed their name as each application may affect more than one person and in some cases, an entire family.

J. Documents Issued

During 2003, Saskatchewan Health issued a total of 68,630 vital event documents. The distribution, by type, of the documents issued in 2001, 2002 and 2003 are given below for comparison.

Table 12. Documents Issued 2001 – 2003

Document type	2001	2002	2003
Birth Certificates	45,041	47,141	48,013
Marriage Certificates	5,199	4,914	5,375
Death Certificates	5,044	4,840	5,040
Copies of Registrations	10,801	10,283	10,202
Total	66, 085	67,178	68,630